Summary of Response

Summary of Summary

Absent Subject Matter

Claim 27(d) recites:

> d) presenting idols on web sites, together with merchandise available for sale, and taking orders for the merchandise from consumers, including consumers in the target group.

("Idols" are animated figures acting a spokespersons, as it were.)

This recitation has not been shown in any reference.

Claim 20 recites:

> c) using the idols in marketing activities; and
>
> d) measuring marketing success of each idol.

These recitations have not been shown in any reference.

re: Anthropomorphic Idol

In general, the claims recite generation of "vectors," which contain attributes of people. The claims recite selection of a "vector," and creation of an "anthropomorphic idol," which has attributes contained in a "vector."

The "idol" is a role model for the customers, as it were. It

is displayed on a computer display, and is used in advertising by the invention.

The important point here is that an "idol" is generated which corresponds to the "vector."

The Cheng reference shows "avatars," which are representations of people. However, the characteristics of his avatars are determined **by those people themselves**. That is, the avatars represent the people, and the characteristics of the avatars **correspond to** the characteristics of the people.

Contrary to Applicant's claims, Cheng does not control the characteristics given to the avatars.

Thus, taking claim 15(d) as an example, Cheng does not

> (d) [select] at least some . . . vectors and, for each, [generate] an animated anthropomorphic idol which displays the attributes of the selected . . . vector.

Again, the characteristics of Cheng's avatars are determined **by Cheng's participants**. Cheng himself does not determine the characteristics of the avatars.

Cheng does not create an avatar based on a selected vector, as in claim 15(d).

Another perspective will support this conclusion.

Assume that a given "vector" exists in Cheng. (This is actually not so.) Assume that no participant in Cheng has the

characteristics represented by that vector.

Under these assumptions, which are quite realistic, no avatar will be created which matches that vector. Consequently, claim 15(d), cited immediately above, is not found: no "anthropomorphic idol" is generated in Cheng, as claimed.

Restated: claim 15(d) recites generation of the "idol," based on the "vector." But if no participant exists in Cheng who matches the supposed "vector," then no such avatar is generated. Cheng does show avatars, but none conform to claim 15(d).

End Summary of Summary

Summary of Response

In a generalized sense, the claims recite:

-- identifying attributes of a target group of people;

-- representing the attributes as a vector;

-- selecting a vector; and

-- generating an animated anthropomorphic idol which displays the attributes of the selected vector.

(See claim 15.)

For example, a role model (the idol) is generated which portrays attributes seen as desirable by the target group.

The Cheng reference does not show this. Cheng shows "avatars"

17, 18, and 19 in his Figure 1a. But those avatars represent "participants" in Cheng's system. (Column 1, lines 45 - 47.) The characteristics of those avatars correspond to the characteristics of the participants. Cheng does not control those characteristics.

Thus, the cause-and-effect relationship of the claims is not present in Cheng. There is no selection of a vector, followed by generation of an anthropomorphic idol which matches the vector.

Cheng does something entirely different. He recognizes that presentation of realistic computer images requires intense data processing. Specifically, a process called "rendering" is used. Cheng chooses, based on criteria which he sets forth, which avatars and objects to render better, and which to render worse.

Cheng allocates his processing power to render certain visual images, and not to others. But he does not show generation of an idol having attributes corresponding to a "vector."

This summary will now rebut a possible argument.

It could be argued that Cheng states that participants can provide a list of features. When an avatar is found having those features, it could be argued that Cheng emphasizes those features in the avatar, by rendering those features and not rendering other features.

Thus, according to the argument, Cheng thereby "customizes" the avatar, and produces an avatar which matches the list. According to the argument, the list corresponds to the vector, and

thus Cheng shows claim 15(d): he generates an avatar having features contained in the list.

The simple rebuttal to this argument is that Cheng chooses **entire** avatars and **entire** objects to render, or not render. Thus, he does not "customize" a given avatar, to emphasize some characteristics and de-emphasize other characteristics. He renders an **entire** avatar, or not at all.

Finally, Cheng is an innocent common-carrier, as it were. He receives avatars from participants, and transmits them to other participants.

But the **characteristics** of the avatars are determined by the participants. Cheng himself does not determine the characteristics of the avatars. The characteristics are determined by the participants.

End Summary

CLAIMS 15 AND 27

Claim 15 and 27 were rejected as obvious, based on Cheng and Lazarus.

Claim 15

Cheng Reference

Cheng appears to be somewhat confusing. However, the undersigned attorney interprets Cheng as teaching the following.

Cheng is concerned with "virtual environments." Such environments display "avatars" 17, 18, and 19 in Cheng's Figure 1a, and other objects.

Avatars are representations of people who utilize Cheng's system. (Column 1, lines 45 - 48.) This is a significant point.

-- The characteristics of the avatars are determined by the characteristics of those people.

-- Cheng does not create the characteristics of the avatars.

Cheng discusses "rendering" of the avatars and objects in his images. Rendering adds color, shadow, detail, and other features, in order to make the images appear realistic. The rendering, in effect, makes the images look like realistic photographs.

Cheng points out that the rendering process requires significant computer processing power. Also, if the images are transmitted over a network, large bandwidth can be consumed.

For example, assume a 480 x 640 VGA display. Very roughly, 480 multiplied by 640 equals about 300,000 pixels. Assume each pixel requires one byte, to indicate color and brightness. If an animated cartoon is to be presented at a standard television video frame rate of 30 frames per second, then 30 x 300,000, or 9 million, bytes must be transmitted per second. This is a large data rate, particularly for low bandwidth connections.

Cheng addresses this problem of limited bandwidth and limited processing power. Cheng selects certain items to render, and leaves other items to be rendered less intensely, or not at all. (Column 10, lines 8 - 12.) Cheng thus allocates a limited resource (the processing power and bandwidth) among the items which he displays.

Thus, if Cheng decides that a certain item is not to be rendered, he transmits a cruder representation of that item to the user's computer. Fewer pixels are required to be transmitted. Conversely, if an item is to be rendered better, more pixels are transmitted to the user.

Cheng gives several criteria by which he selects items to render. One criterion is whether an item is central to the field-of-view of the person looking at the item. (Column 9, top.)

Another criterion is whether an avatar displayed is listed as a friend of the person viewing the avatar. If so, that avatar is rendered better. It not, then the avatar is rendered less. (Column 9, lines 42 - 46.)

The determination of whether to render an avatar more or less well is based on a measure which Cheng calls "priorities."

Cheng states that priorities can be determined in several ways. One way is based on traits of the person 14 viewing the display in Cheng's Figure 1a. He gives an example at the bottom of column 22, wherein he discusses assigning priorities to an

"avatar."

It is significant that Cheng assigns "priorities" to objects or avatars **as a whole**. That is, he improves rendering of **an entire avatar or object**, and not part of that avatar/object. (Abstract, lines 4 - 6; column 2, lines 21 - 27, for example.)

This point is significant because Applicant's claims recite, in a generalized sense, displaying characters on a computer screen which portray attributes found in a target group of people. Cheng states (column 19, line 40 et seq.) that his priorities can be determined based on a "list" of "views and opinions" of the observer. To some, that may seem to show part of Applicant's invention. Thus, based on Cheng, the following argument could be made, with respect to a given avatar:

Hypothetical Argument

Cheng emphasizes (ie, renders better) those aspects which the observer likes,

and

Cheng de-emphasizes (ie, renders less) those aspects which the observer dislikes.

In so doing, Cheng presents an "anthropomorphic idol which displays the attributes of the selected consumer vector," as in claim 15 and other claims.

However, this argument fails. Cheng **does not** selectively emphasize and de-emphasize aspects of a given avatar. The **entire avatar** is either rendered better or worse. Thus, Cheng's avatars are not "customized," as by emphasizing items on the viewer's "list" and de-emphasizing other items. The **entire avatar** is either rendered better or worse.

Second Hypothetical Argument

This fact leads to another possible argument. It could be argued that, if an **entire avatar** is found in Cheng, which corresponds to the "views and opinions" on a "list," then Cheng renders that avatar better, thus showing the invention.

However, this argument also fails. The reason is that the avatar in question is not created by Cheng, based on a selected consumer vector, as in the claims. The features of that avatar are beyond Cheng's control, and are determined by the features of the "participant" who created that avatar. (Column 1, lines 45 - 47.)

Stating the preceding in another way, Cheng discusses a "list" of "views and opinions" of the observer. (Column 19, lines 43, 44.) It could be argued that if a given list contains "views and opinions" A through Z, and if a certain avatar also possesses those views and opinions, then that avatar will be emphasized, thereby displaying an "anthropomorphic idol which displays the attributes

of the selected consumer vector," as in claim 15 and other claims.

However, that is not so, for several reasons.

REASON 1

One is that Cheng's invention did not create the avatar in question. A participant did. Cheng merely renders that avatar in greater detail. But that avatar is a representation of another person. (Column 3, lines 26 - 28.) The features of that avatar are determined by the other person, who is the creator of the avatar.

From another point of view, assume

1) a certain list of "views and opinions" of

a certain observer

and

2) that no other person has created an avatar

having those "views and opinions."

In this case, no "anthropomorphic idol" matching the observer's vector, as in the claims, exists. Thus, the recited cause-and-effect relationship of claim 15 is absent.

Restated, claim 15(d) recites:

> d) selecting at least some of the consumer vectors and, for each, generating an animated anthropomorphic idol which displays the attributes of the selected consumer vector.

If no other person has generated an avatar which matches the observer's "list" of "views and opinions," then no such "idol" in claim 15 is present.

Cheng does not do what claim 15 recites. The characteristics of his avatars are determined by their respective creators. Those characteristics are not determined by any "consumer vectors." The cause-and-effect relationship of claim 15(d) is absent:

> -- no "selection" of a "consumer vector" is present;
>
> -- no generation of "an animated anthropomorphic idol which displays the attributes of the selected consumer vector" is present.

REASON 2

A second reason is that claim 15 states that "for each" selected vector, an anthropomorphic idol is generated. Ten vectors, ten idols.

That has simply not been shown in Cheng. The mere presence of an avatar in Cheng which happens to match the "views and opinions" on a "list" does not amount to generating "an anthropomorphic idol" "for each" selected "consumer vector."

Application to Claims

Claim 15 recites:

15. A method, comprising:

a) identifying a target group of persons;

b) identifying attributes of persons in the target group,

c) representing attributes in consumer vectors, one vector per person, thereby producing a plurality of consumer vectors; and

d) selecting at least some of the consumer vectors and, for each, generating an animated anthropomorphic idol which displays the attributes of the selected consumer vector.

The Office Action asserts that Cheng shows all of claim 15, except the "consumer vectors." Applicant submits that several problems exist in this assertion.

Problem 1

One is that the Office Action's assertion is self-contradictory. It asserts that the "vectors" of claim 15(c) are found in Cheng, but "consumer vectors" are not. However, that cannot be so.

Claim 15(c) defines what the "consumer vectors" are. If "consumer vectors" are not present in claim 15, then the previously recited "vectors" are not present either, contrary to the PTO's assertion.

Problem 2

Cheng does not, in fact, show the elements of claim 15. At best (for the PTO), Cheng shows "participant profiles" which contain "views and opinions" of the participant. (Column 19, lines 41 - 51.) But he does not use those "participant profiles" as recited in claim 15(d), which states:

> d) selecting at least some of the consumer vectors and, for each, generating an animated anthropomorphic idol which displays the attributes of the selected consumer vector.

He does not use the "participant profiles" as claimed, for at least three reasons.

Reason 1

One is that claim 15(d) states that the "anthropomorphic idol" "displays the attributes of the selected consumer vector." For example, if a selected consumer vector states that a male consumer

1) wears rugby jerseys,
2) drinks diet Coke,
3) drives a Corvette, and
4) smokes Marlboros,

then, under claim 15(d), the anthropomorphic idol would be a Marlboro-smoking, Corvette-driving, diet-Coke-drinking, rugby-jersey-wearing male.

Cheng does not show that. He does not state that his avatar is created, based on characteristics of the "list" of column 19, lines 41 - 51. As stated above, his avatars represent his participants. The characteristics of the avatars are beyond his control.

Reason 2

A second reason is that the attributes of the Cheng's avatar are determined in advance. For example, at the bottom of column 22, Cheng discusses "celebrity avatars," which are presumably avatars which represent movie stars and the like.

The attributes of those avatars are clearly determined by the attributes of the celebrity himself. The "observer" merely expresses a like or dislike for that avatar, which is presumably then used in a decision by Cheng to render that avatar in greater or lesser degree.

But the celebrity-avatar is not assigned the characteristics of the vector. The celebrity-avatar is not assigned "attributes" of the "observer." The individual characteristics of the celebrity-avatar are not adjusted, based on the vector. The individual characteristics are those of the actual celebrity.

That must be the case. Otherwise, the avatar would not resemble the celebrity, and the concept of a celebrity-avatar would make no sense.

Reason 3

A third, technical, reason is that each vector of claim 15 corresponds to an individual person. Claim 15(d) recites "selecting at least some of the consumer vectors." This selection process has not been shown in Cheng.

In column 19, lines 41 - 51, Cheng may discuss a "list" of a participant's likes and dislikes. Even if that "list" is considered a vector, it is only a **single** vector, corresponding to a **single** person. Claim 15(d) does not recite that.

Problem 3

Claim 15 recites:

> a) identifying a target group of persons;
>
> b) identifying attributes of persons in the target group,
>
> c) representing attributes in consumer vectors . . .

Applicant cannot locate these three recitations in Cheng and requests, Applicant requests, under 37 CFR §§ 1.104(c)(2) and 35 U.S.C. § 132, that the PTO specifically identify these three elements in Cheng:

1. the "target group,"
2. "identifying" the "target group"

3. identifying "attributes of persons" in the target group.

Stating this another way, if a "target group" is "identified," then some persons must be present in Cheng which are **not identified**. Where are those persons ?

Problem 4

An additional problem is that the Office Action does not comply with MPEP § 707, which states:

> . . .
>
> (2) In rejecting claims for want of novelty or for obviousness, the examiner must cite the best references at his or her command.
>
> When a reference is complex or shows or describes inventions other than that claimed by the applicant, **the particular part relied on must be designated as nearly as practicable**.

The Office Action fails to comply with the **highlighted** phrase. The Office Action has, in effect, cited every line, in every column, of Cheng, to show claim 15. That does not comply with this MPEP section.

Therefore, the preceding discussion indicates that Cheng does not show the parts of claim 15 for which Cheng is cited, and those parts of claim 15 have not been identified in Cheng in the manner required by the MPEP.

Lazarus Reference

Lazarus discusses a system wherein "merchant vectors" 402 are processed, in order to ascertain "co-occurrences." A co-occurrence is a purchase made within a prescribed time-window. Items 108 in his Figure 1c indicate time-windows. (Column 8, lines 63, 39 - 51.) According to Lazarus, identifying co-occurrences is apparently valuable for marketing strategies.

Applicant points out that the "vectors" in Lazarus do not indicate what the consumers **actually purchased**. (See Figures 7a and b.)

Combination of References

No Teaching Given

No teaching has been given for combining the references. The rationale given, page 4 of the Office Action, merely sets forth one quote taken from each of the references. Those quotes set forth broad purposes of each reference.

Those quotes do not qualify as teachings.

Further, each reference, **by itself**, presumably attains the goal(s) set forth in its respective quote. No reason has been advanced why another reference is required to attain that goal.

Further still, no showing has been given as to how the combination of references attains the goal(s) set forth in either

quote.

Rationale Merely Asserts that Combining References is Obvious But They Can be Combined in Ways Which do not Produce the Invention

The PTO has not shown claim 15 as a whole in the combination of references. Instead, the PTO has merely asserted that it is obvious to combine certain supposed content of Lazarus (consumer vectors and target segments) with Cheng. However, that does not show claim 15.

For example, Cheng discusses an approach to selecting which items in a computer display to "render." Lazarus discusses "vectors," which are sometimes displayed on a computer display, as in "reports" 428, 430, and 432 in his Figure 4a, which are transmitted to a computer (not labeled).

Thus, one could combine the references in this way: Lazarus's "reports" are displayed on Cheng's computer screen, and Cheng then determines how to render them.

That combination does not show claim 15.

Therefore, merely asserting that references should be combined is insufficient. Applicant has just shown a combination which does not attain claim 15. The PTO is required to show how its combination produces claim 15 and not, for example, the non-claim-15 combination just demonstrated.

References are Non-Analogous

The references are non-analogous art.

Cheng is concerned with how to choose items for rendering in a computer display.

Lazarus is concerned with detecting spending patterns in credit-card customers.

Neither reference solves a problem relevant to the other, and neither reference solves a problem relevant to claim 15.

MPEP § 2141.01(a) states:

> Analogous and Nonanalogous Art
>
> TO RELY ON A REFERENCE UNDER 35 U.S.C. 103, IT MUST BE ANALOGOUS PRIOR ART
>
> The examiner must determine what is "analogous prior art" for the purpose of analyzing the obviousness of the subject matter at issue.
>
> "In order to rely on a reference as a basis for rejection of an applicant's invention, the reference must either be in the field of applicant's endeavor or, if not, then be reasonably pertinent to the particular problem with which the inventor was concerned." [Citations.]
>
> "A reference is reasonably pertinent if, even though it may be in a different field from that of the inventor's endeavor, it is one which, because of the matter with which it deals, logically would have commended itself to an inventor's attention in considering his problem." [Citation.]

Applicant's invention concerns, in a simplified sense,

displaying a cartoon figure having characteristics with which a customer identifies. Neither reference discusses that.

Therefore, for the preceding reasons, Applicant submits that the rejection of claim 15 is insufficient.

Claim 27

Claim 27 recites, in part:

> . . .
>
> d) presenting idols on web sites, together with merchandise available for sale, and taking orders for the merchandise from consumers, including consumers in the target group;
>
> e) generating a mapping of information which indicates, for each consumer vector, which idol vectors resulted in successful sales;
>
> f) ascertaining a mapping of the vectors which indicates which idols should be used for marketing activities to a sub-group of consumers, having consumer vectors identical to vectors selected from the target group.

These claim recitations have not been identified in the applied references. MPEP § 2143.03 states:

> To establish prima facie obviousness . . . **all the claim limitations** must be taught or suggested by the prior art.

The wholesale citation of both Cheng and Lazarus to show these

claim elements is insufficient.

Further, the Office Action, page 13, combines the "vectors" of Lazarus with Cheng. However, Lazarus shows a system of analyzing customer purchases, for marketing purposes. Cheng does not sell anything. There is no reason to combined these references.

Claim 20

Claim is the remaining independent claim. It recites, in part:

> . . .
>
> c) using the idols in marketing activities; and
>
> d) measuring marketing success of each idol.

For example, different idols are generated, and "tried out" on the consuming public.

"Measuring marketing success of each idol" has not been shown in the prior art. Lazarus may measure market success, but not "of idols."

Dependant Claims

The dependant claims are seen as allowable, based on their parents. In addition, Applicant submits the following comments.

Claim 17

Claim 17 recites:

> 17. Method according to claim 16, wherein the consumers include consumers in the target group.

Under parent claim 16, web sites on which the idols are available, are "available to consumers." Claim 17 states that these "consumers" include "consumers in the target group."

Consequently, some of the idols will possess attributes of the consumers of claim 17. That has not been shown in the references.

It may be true that Cheng's avatar 18 in his Figure 1a represents the avatar of his participant. However, the PTO has not shown that Cheng's participant is part of the "target group," as recited in parent claim 15.

Claim 18

"Official Notice" is taken of offering merchandise for sale at web sites, using idols. The undersigned attorney respectfully traverses this Official Notice and requests a citation of evidence showing the practice. (See MPEP § 2144.03.)

One reason is that no evidence has been given which shows that the Noticed subject matter lies in a field which is analogous to the references or the invention. Another reason is that no patent

has been cited showing the recited idols at web sites, selling merchandise. Thus, it seems likely that Applicant is the first inventor of this concept.

Claims 21 - 26

The undersigned attorney respectfully traverses the invocation of Official Notice, and requests that the Noticed subject matter be shown in the prior art.

Comment on Rationales for Combining References

In all cases, that is, in the rejection of all claims, the Office Action relies on two citations taken from the references as teachings. One is Lazarus, column 3, lines 1 - 4. The other is Cheng, column 3, lines 14 - 20.

As explained above, these two passages merely set forth goals of each reference. That is not a teaching for combining the references.

In addition, each reference presumably attains that goal. Since neither reference mentions the other, each presumably attains its goal **without the assistance of the other**.

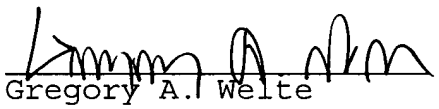
Thus, a statement of the goals in no way acts as a teaching to combine the references.

Conclusion

Applicant requests that the rejections to the claims be reconsidered and withdrawn.

Applicant expresses thanks to the Examiner for the careful consideration given to this case.

Respectfully submitted,



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